

Amendments to the Claims

The following listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1. (Currently amended) A prosthetic elbow for attachment to a humerus and ulna, the prosthetic elbow comprising:

a humeral component comprising a generally cylindric spool having a contoured external surface defining a first articular surface, said spool being sized and shaped to fit within a recess cut between medial and lateral aspects of a condyle of the humerus;

a radioulnar component comprising

a body having base and a pair of spaced apart, first and second arms extending outward from the base, together defining generally U-shaped contour with an inner peripheral surface defining a second articular surface sized and shaped for engagement with the first articular surface and relative movement thereagainst, and

a peg sized and shaped for being received in an axial bore in the ulna, the peg extending laterally outward from the first arm adjacent to the base,

wherein the second arm of the body has a bore extending longitudinally therein in a direction generally orthogonal to the peg, the bore being sized and shaped for receiving a fastener inserted in an olecranon process of the ulna generally transverse to the longitudinal axis of the ulna to secure the radioulnar component to the ulna.

2. (Original) A prosthetic elbow as set forth in claim 1 wherein the inner peripheral surface of the radioulnar component comprises a bearing surface extending along a circular arc through at least about 180 degrees.

3. (Previously presented) A prosthetic elbow as set forth in claim 2 wherein the radioulnar component is formed of a flexible and resilient material for snap-fit attachment of the spool to the radioulnar component.

4. (Previously presented) In combination, a prosthetic elbow as set forth in claim 1 with humeral and radioulnar positional guides, each of the guides for locating surgical cuts to remove portions of a humerus and ulna to permit implantation of the respective components at locations for proper joint function, each of the guides configured for visual and anatomical alignment with the respective humerus and ulna for rotation of the prosthetic elbow about the physiological center of rotation of the natural elbow.

5. (Original) A prosthetic elbow as set forth in claim 1 further comprising a stem attached to the spool and extending generally radially therefrom, the stem configured for being received in a medullary canal of the humerus.

6. (Original) A prosthetic elbow as set forth in claim 1 wherein the humeral component has a bore extending axially through the spool for receiving at least one fastener to attach the humeral component to the humerus, the humeral component being free of a stem for extending into a medullary canal of the humerus.

7. (Original) A prosthetic elbow as set forth in claim 1 wherein the spool has a cavity for receiving bone.

8. (Currently amended) A prosthetic elbow for attachment to a humerus and ulna, the prosthetic elbow comprising:

a humeral component comprising a generally cylindric spool having a contoured external surface defining a first articular surface;

a radioulnar component comprising

a body having base and a pair of spaced apart, first and second arms extending outward from the base, together defining generally U-shaped contour with an inner peripheral surface defining a second articular surface sized and shaped for engagement with the first articular surface and relative movement thereagainst, and

a peg sized and shaped for being received in an axial bore in the ulna, the peg extending laterally outward from the first arm adjacent to the base,

wherein the second arm of the body has a bore extending longitudinally therein in a direction generally orthogonal to the peg, the bore being sized and shaped for receiving a fastener inserted in an olecranon process of the ulna generally transverse to the longitudinal axis of the ulna to secure the radioulnar component to the ulna,

wherein the humeral component has a bore extending axially through the spool for receiving at least one fastener to attach the humeral component to the humerus, at least a portion of the bore being completely surrounded by the spool, the

humeral component being free of a stem for extending into a medullary canal of the humerus.

9. (Previously presented) A prosthetic elbow as set forth in claim 8 wherein the humeral component further comprises a stabilizer for engaging the humerus for fixation and preventing rotation of the spool about the bore.

10. (Previously presented) A prosthetic elbow as set forth in claim 9 wherein the stabilizer comprises a peg extending from the spool in a generally axial direction for engaging the humerus for fixation and preventing rotation of the spool about the bore.

11. (Previously presented) A prosthetic elbow as set forth in claim 9 wherein the stabilizer comprises a panel extending from the spool in a generally axial direction for engaging the humerus for fixation and preventing rotation of the spool about the bore.

12. (Previously presented) A prosthetic elbow as set forth in claim 11 wherein the stabilizer further comprises another panel extending from the spool in a generally axial direction for engaging the humerus for fixation and preventing rotation of the spool about the bore.

13. (Original) A prosthetic elbow as set forth in claim 12 wherein each of the panels has at least one cleat for attaching the humeral component to the humerus.

14. (Original) A prosthetic elbow as set forth in claim 8 wherein the spool has a cavity for receiving bone.

15. (Previously presented) A prosthetic elbow as set forth in claim 1 wherein the body of the radioulnar component is configured for snap-fit attachment to the spool.

16. (Previously presented) A prosthetic elbow for attachment to a humerus and ulna, the prosthetic elbow comprising:

a humeral component comprising a generally cylindric spool having a contoured external surface defining a first articular surface;

a radioulnar component comprising a body having a generally U-shaped contour with an inner peripheral surface defining a second articular surface sized and shaped for engagement with the first articular surface;

wherein the humeral component has a bore extending axially through the spool for receiving at least one fastener to attach the humeral component to the humerus, the humeral component being free of a stem for extending into a medullary canal of the humerus, the humeral component comprising a stabilizer extending axially from the spool for engaging the humerus for fixation and preventing rotation of the spool about the bore.

17. (Previously presented) A prosthetic elbow as set forth in claim 16, wherein the stabilizer has a thickness that is less than a diameter of the spool.

18. (Previously presented) A prosthetic elbow as set forth in claim 17 wherein the stabilizer comprises a peg extending from the spool in a generally axial direction for engaging the humerus for fixation and preventing rotation of the spool about the bore.

19. (Previously presented) A prosthetic elbow as set forth in claim 17 wherein the stabilizer comprises a panel extending from the spool in a generally axial direction for engaging the humerus for fixation and preventing rotation of the spool about the bore.

20. (Previously presented) A prosthetic elbow as set forth in claim 1 wherein the radioulnar component is adapted for attachment to both the ulna and an associated radius.